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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/806,840

03/22/2004

Darren R. Sherman

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7590

10/16/2006

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EXAMINER

DEMILLE, DANTON D

ART UNIT

PAPER NUMBER

3771

DATE MAILED: 10/16/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/806,840

Applicant(s)

SHERMAN ET AL.

Examiner

Danton DeMille

Art Unit

3771

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-7 and 9-18 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-7 and 9-18 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. ____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date ____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: ____.

DETAILED ACTION

Claims 1-7, 9, 18 rejected under 35 U.S.C. 103(a) as being unpatentable over Lach et al. (US 4770164) alone or in view of Baldwin, II (US 6,171,267).

As noted before, Lach teaches a belt, a belt tensioning means and a motor embodiment is recited in column 11, lines 41+. Lach also teaches a suitable electrical holding circuit is used to cause the motor to stop the socket in the desired maximum-tautness, column 11, line 66 - column 12 line 2. This would appear to comprehend the claimed brake operably connected to the belt tensioning means capable of stopping the belt tensioning means in a tightened state. Lach also teaches that a microprocessor can also be used to control the operation of the device in column 12, lines 21-23. Lach teaches the steps of cyclically tightening and loosening the belt to perform chest compressions. Also taught is an electrical holding circuit that causes the motor to stop at the desired maximum tightness. This step recites that the motor is stopped at the desired maximum tightness. This momentary stopping of the motor at the desired maximum tightness would appear to comprehend the claimed "momentarily hold the belt at this threshold of tightness" because it motor would momentarily stop or hold the belt at the threshold of tightness. It is not clear how this moment would be any different from the claimed momentary hold.

While Lach may not specifically state that there is a program to control the operation of the device, Lach does teach that a microprocessor is preferred to provide high reliability of these systems. There appears to be no unobviousness to modify Lach to use the microprocessor as taught by Lach to control the operation of the device to include programming to cause repeated cycles of tightening of the belt to a set threshold value.

If it is viewed that the holding circuit to stop the belt at the desired amount of tightness does not provide the claimed momentary hold such would have been obvious to one of ordinary skill. Lach appears silent with regard to the exact timing of the cyclic operation. Baldwin teaches that during CPR it is beneficial to time the compression cycles with the systolic phase to assist the heart. Figure 14 shows that compression cycle is held until the end of the systolic phase. It would have been obvious to one of ordinary skill in the art to further modify Lach to time the pressure compressions to the systolic phase that includes a momentary hold as taught by Baldwin to assist the heart rather than randomly that might counteract the natural compressions of the heart.

Claims 10-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Lach et al. (US 4,770,164) as set forth above in claim 1 and further in view of Smith (US 3,835,847).

Lach teaches belt take-up means 72 and a motor operably connected to the belt in figure 4 and column 11, line 41+. Lach teaches the importance of taking up the slack when assembling the device about the patient. Lach does it by hand however, automating this feature to would have been an obvious provision to one of ordinary skill in the art. With the motor and microprocessor controller it would have been an obvious extension to automate this feature as well. Smith also teaches this convention of taking up the slack automatically in column 8, lines 15-19. It would have been obvious to one of ordinary skill in the art to modify Lach to automate the slack take-up as taught by Smith so that this feature can be automated and not have to be done by hand. Smith teaches that the slack is taken up until the tension has reached a selected level. Regarding claim 19, Lach also includes a brake means for the motor in the form of circuit

interrupter switches and electrical holding circuits to cause the motor to stop in the desired maximum tautness, column 11, lines 64-column 12 line 2. The microprocessor would have to control the operation of the motor.

Double Patenting

The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

Claims 1-7, 9-18 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-40 of U.S. Patent No. 6,709,410. Although the conflicting claims are not identical, they are not patentably distinct from each other because it would have been obvious to leave out the details of the encoder.

Claims 1-7, 9-18 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-30 of copending Application No. 10/427,645. Although the conflicting claims are not identical, they are not

patentably distinct from each other because it would have been obvious to leave out the details of the diameter of the spool.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Claims 1-7, 9, 18 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-3 of U.S. Patent No. 6,447,465.

Although the conflicting claims are not identical, they are not patentably distinct from each other because it would have been obvious to leave out the details of the second drive spool.

Claims 10-17 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-3 of U.S. Patent No. 6,447,465 in view of Smith (US 3,835,847). It would have been obvious to one of ordinary skill in the art to modify Lach to automate the slack take-up as taught by Smith so that this feature can be automated and not have to be done by hand.

Claims 1-7, 9, 18 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-6 of U.S. Patent No. 6,616,620.

Although the conflicting claims are not identical, they are not patentably distinct from each other because it would have been obvious to leave out the details of the gearbox.

Claims 10-17 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-6 of U.S. Patent No. 6,616,620 in view of Smith (US 3,835,847). It would have been obvious to one of ordinary skill in the art to modify the patent claims to automate the slack take-up as taught by Smith so that this feature can be automated and not have to be done by hand.

Claims 1-7, 9, 18 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-24 of U.S. Patent No. 6,869,408.

Although the conflicting claims are not identical, they are not patentably distinct from each other because it would have been obvious to leave out the details of the second abdominal belt.

Claims 10-17 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-24 of U.S. Patent No. 6,869,408 in view of Smith (US 3,835,847). It would have been obvious to one of ordinary skill in the art to modify the patent claims to automate the slack take-up as taught by Smith so that this feature can be automated and not have to be done by hand.

Claims 1-7, 9-18 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-40 of copending Application No. 10/464,806 in view of Baldwin II. It would have been obvious to one of ordinary skill in the art to further modify the pending claims to time the pressure compressions to the systolic phase that includes a momentary hold as taught by Baldwin to assist the heart rather than randomly that might counteract the natural compressions of the heart.

This is a provisional obviousness-type double patenting rejection.

Claims 1-7, 9-18 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-27 of copending Application No. 11/084506 in view of Baldwin II. It would have been obvious to one of ordinary skill in the art to further modify the pending claims to time the pressure compressions to the systolic phase that includes a momentary hold as taught by Baldwin to assist the heart rather than randomly that might counteract the natural compressions of the heart.


This is a provisional obviousness-type double patenting rejection.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Danton DeMille whose telephone number is (571) 272-4974. The examiner can normally be reached on M-F from 8:30 to 6:00 EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Justine Yu, can be reached on (571) 272-4835. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

10 October 2006


Danton DeMille
Primary Examiner
Art Unit 3771